COMMONWEALTH OF MASSACHUSETTS
DEPARTMENT OF TELECOMMUNICATIONS AND ENERGY

RESPONSE OF BAY STATE GAS COMPANY TO THE
FOURTEENTH SET OF INFORMATION REQUESTS FROM ATTORNEY GENERAL
D. T. E. 05-27

Date: June 23, 2005

Responsible: Danny G. Cote, General Manager

AG-14-28 Refer to the Company's response to AG-2-16(a), p. 28 of 34. What year in the 1980s did BSG start to replace its "unprotected steel pipes." Why did BSG select this year to start a replacement program? Provide copies of all reports, studies, analyses, memos and other documents which lead BSG to commence replacement of its unprotected steel.

Response: The report referenced as AG-2-16 (b) is a report and analysis provided by R.J. Rudden Associates. Their data and conclusions in the report stand-alone based on their analysis.

Bay State Gas Company replaces its mains and services annually based on several drivers. The Company cannot specify the exact date of when the "first" upprotected steel main was replaced but it was certainly well before 1980's. As unprotected steel has needed to be replace based on Bay State's replacement program, it has been replaced according to good utility practice and reasonable operating procedures. As described in previous responses, main replacement decisions in general are based on several factors including corrosion, system improvements, and planned municipal projects. Any one of these drivers or all of them could result in the replacement of any segment of steel main and certainly all these factors have been in play through out the life cycle of any piece of unprotected steel in Bay State's service territory.

Therefore, although the AG-2-16 (b), p.28 of 34 reports that Bay State, along with many gas distribution companies, began replacing their unprotected steel pipe in the 80's, segments of unprotected steel pipes were replaced prior to the 1980's due the aforementioned reasons. The replacement approach would have been on a case-by-case basis resulting from subterranean utility conflicts arising from road reconstruction or system improvement needs and/or design criteria.

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D. T. E. 05-27

Date: June 23, 2005

Responsible: Danny G. Cote, General Manager

AG-14-29 Refer to the Company's response to AG-2-16(a), p. 28 of 34. What year did BSG start to replace its bare steel mains. Why did BSG select this year to start a replacement program? Provide copies of all reports, studies, analyses, memos and other documents which lead BSG to commence replacement of its unprotected steel. When did BSG first become aware that bare steel would experience corrosion problems.

Response The report referenced as AG-2-16 (b) is a report and analysis provided by R.J Rudden Associates. Their data and conclusions in the report stand-alone based on their analysis.

Bay State Gas Company replaces its mains and services annually based on several drivers. The Company cannot specify the exact date of when the "first" bare steel main was replaced but it was certainly well before 1980's. As bare steel has deteriorated, it has been replaced according to good utility practice and reasonable operating procedures. As described in previous responses, main replacement decisions in general are based on several factors including corrosion, system improvements, and planned municipal projects. Any one of these drivers or all of them could result in the replacement of any segment of steel main and certainly all these factors have been in play through out the life cycle of any piece of bare steel in Bay State's service territory.

Therefore, although the AG-2-16 (b), p.28 of 34 reports that Bay State, along with many gas distribution companies, began replacing their unprotected steel pipe in the 80's, segments of unprotected steel pipes were replaced prior to the 1980's due the aforementioned reasons. The replacement approach would have been on a case-by-case basis resulting from subterranean utility conflicts arising from road reconstruction or system improvement needs and/or design criteria.

COMMONWEALTH OF MASSACHUSETTS
DEPARTMENT OF TELECOMMUNICATIONS AND ENERGY

RESPONSE OF BAY STATE GAS COMPANY TO THE
FIFTEENTH SET OF INFORMATION REQUESTS FROM THE ATTORNEY GENERAL
D. T. E. 05-27

Date: June 23, 2005

Responsible: John E. Skirtich, Consultant (Revenue Requirements)

AG-15-1 The Company describes the process by which it calculated the "service or meter reading" lag of 15.29 days, however it does not define the term. Please provide a definition of the term "service or meter reading" lag and explain why it is such a large component of the lead lag study.

Response: The "service or meter reading" lag represents the number of days from the midpoint to the end of the billing period in which service was provided. Service is provided daily and billed on a monthly basis via the company's Customer Information System and generally consists of 28 to 31 or 32 days. To determine the lag from provision of service to payment, the starting point is the midpoint of service. The "service or meter reading" lag is a standard component of the revenue lag.

The reason the lag is so large, relatively speaking, is that customers are billed on a monthly basis. If the were billed on a semimonthly basis, the lag would be approximately half of the 15.29 days; weekly would be about 3.5 days.

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RESPONSE OF BAY STATE GAS COMPANY TO THE
FIFTEENTH SET OF INFORMATION REQUESTS FROM THE ATTORNEY GENERAL
D. T. E. 05-27

Date: June 23, 2005

Responsible: Stephen H. Bryant, President

AG-15-3 Identify the frequency in which the Company inspects and replaces its customer's meters. Provide all relevant Company policies and procedures related to the inspection and replacement of customer meters.

Response: Bay State changes no less than one seventh of installed meters each year. In accordance with a waiver letter from the Department dated December 7, 2000, Bay State selects meters for exchange based on the need to convert the associated automatic meter reading technology from Metscan to Itron ERT devices. During this conversion period the Company may operate meters in excess of the seven-year statutory requirement between January 1, 2001 and December 31, 2007. All meters are inspected and tested prior to reinstallation. Bay State meter replacement policy is consistent with the statutory requirement, which mandates this activity. This process is not codified with policies and procedures.

COMMONWEALTH OF MASSACHUSETTS
DEPARTMENT OF TELECOMMUNICATIONS AND ENERGY

RESPONSE OF BAY STATE GAS COMPANY TO THE
FIFTEENTH SET OF INFORMATION REQUESTS FROM THE ATTORNEY GENERAL
D. T. E. 05-27

Date: June 23, 2005

Responsible: John E. Skirtich, Consultant (Revenue Requirements)

AG-15-5 The Company states that the revenue lag calculated for O&M working capital is different from purchased gas working capital because it includes activities related to Energy Products and Services and rental income. Please explain the cause of the slightly greater lag in receipt of payment for such services. Identify where this increase in lag is calculated and then applied within the workpapers filed in this case.

Response: Separate revenue lags are calculated for Gas Revenue and Total Revenue within the lead-lag study. The lead-lag study is presented in Exhibit BSG/JES-2 ("Exhibit"). Schedule WC-2 of the Exhibit shows the calculation of the Gas Revenue lag of 62.64 days. The calculation includes just gas service revenue activity.

Schedule WC-5 of the Exhibit calculates the Total Revenue lag of 62.83 days by adding to the gas revenue the Miscellaneous Service Revenue or Energy Products and Service ("EP&S") revenue. The difference is slight, just .19 day. I expect the difference is due to partial payments made by customers, i.e., when a customer makes a payment but it doesn't cover both the utility service and EP&S amount, the utility service is covered first, and the difference is then applied to EP&S.

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DEPARTMENT OF TELECOMMUNICATIONS AND ENERGY

RESPONSE OF BAY STATE GAS COMPANY TO THE
SIXTEENTH SET OF INFORMATION REQUESTS FROM THE ATTORNEY GENERAL
D. T. E. 05-27

Date: June 24, 2005

Responsible: Earl M. Robinson, Consultant (Depreciation)

AG-16-1 Please provide the following information for the Company's coated steel mains with cathodic protection:
(1) the test-year end balance of plant in service;
(2) the test-year end balance of accumulated depreciation;
(3) the year-by-year dollar amounts and footage amounts of additions of that type of main to plant in service from the date that it was originally installed on the Company's system;
(4) the year-by-year dollar amounts and footage amounts of retirements from the date that type of main was originally installed on the Company's system;
(5) an Observed Life Table for that type of main similar to that prepared by Mr. Robinson; and
(6) an Original and Smooth Survivor Curve for that type of main similar to that prepared by Mr. Robinson.

Response: Coated steel mains are not specifically identified on company records, by dollars or by footage, as to whether or not they are cathodically protected.

COMMONWEALTH OF MASSACHUSETTS
DEPARTMENT OF TELECOMMUNICATIONS AND ENERGY

RESPONSE OF BAY STATE GAS COMPANY TO THE
SIXTEENTH SET OF INFORMATION REQUESTS FROM THE ATTORNEY GENERAL
D. T. E. 05-27

Date: June 24, 2005

Responsible: Earl M. Robinson, Consultant (Depreciation)

AG-16-2 Please provide the following information for the Company's coated steel mains without cathodic protection:

(1) the test-year end balance of plant in service;
(2) the test-year end balance of accumulated depreciation;
(3) the year-by-year dollar amounts and footage amounts of additions of that type of main to plant in service from the date that it was originally installed on the Company's system;
(4) the year-by-year dollar amounts and footage amounts of retirements from the date that type of main was originally installed on the Company's system;
(5) an Observed Life Table for that type of main similar to that prepared by Mr. Robinson; and
(6) an Original and Smooth Survivor Curve for that type of main similar to that prepared by Mr. Robinson.

Response: Coated steel mains are not specifically identified on company records, by dollars or by footage, as to whether or not they are cathodically protected.

COMMONWEALTH OF MASSACHUSETTS
DEPARTMENT OF TELECOMMUNICATIONS AND ENERGY

RESPONSE OF BAY STATE GAS COMPANY TO THE
SEVENTEENTH SET OF INFORMATION REQUESTS FROM ATTORNEY GENERAL
D. T. E. 05-27

Date: June 23, 2005

Responsible: Joseph A. Ferro, Manager Regulatory Policy

AG-17-1 Referring to Exhibit BSG/JAF-1, Page 35, please provide itemize and quantify the part of revenue annualization adjustment attributable to each of the factors cited on lines 8-9.

Response: Schedule JAF-1-1 is a summary of revenue beginning with how revenue was recorded on the company's Financial Statements (column 1) and ending with calculated pro-forma test year delivery service base revenue at current rates as a basis of determining revenue requirement (column 7). Column 2 on the schedule identifies calculated gas cost recovery revenue, column 3 shows non-recurring revenue, column 4 identifies calculated DAF revenue, and column 5 shows the revenue impact of weather normalization. From column 1, columns 2, 3, 4, are subtracted and column 5 is added. The resulting total is compared to column 7 and the difference is shown in column 6 (adjustment to reflect annualization).

1) It was the company's original intent to show billed gas cost and unbilled gas cost in separate columns on schedule JAF 1-1. It was later decided to show both billed and unbilled gas cost in column 2 (GAF per books). However unbilled gas cost was inadvertently omitted from column 2 leaving only billed gas cost for the filing. As a result, unbilled gas cost fell into the column 6 by default. Attachment AG-17-1(a) is a spreadsheet showing monthly per books unbilled gas cost that by default fell in column 6. The total amount was ($12,266,071). It is important to note, column 7 that carries through for the determination of revenue requirement was not affected by the omission.

2) Revenue from Interruptible sales service was eliminated from the pro-forma revenue resulting in ($2,904,376) of the difference in column 6. (See response to AG-17-2)

3) Special Contract customer no. 2's test year revenue was calculated to be $51,424 in the original filing. However, the customer's contract has a minimum annual charge provision of $456,276 billable on the customer's anniversary date in April of each year of the contract. As a result, ($404,852) in column 6 is attributed to the omission of the minimum annual charge. Note: this omission does impact column 7. (Also see response to AG-9-1)

4) The test year was a leap year. When calculating the weather normalized volumes on a calendar year basis, the company also adjusted volumes to reduce the number of days from 366 to 365.25. The revenue impact of this reduction makes up an estimated ($86,647) of the difference in column 6. The detail of this estimated revenue is presented on Attachment AG-17-1(b).

5) Throughout the test year, adjustments are made to accounts. Following the rules of accrual accounting, these adjustments are recorded on the company's books in the month that the adjustment is recorded on the customer's bill. However, these adjustments are always for prior month's billings and often at different gas cost rates, base rates (seasonal), sometimes different rate schedules (annual review of account) and prorated if the adjusted month's bill is in May or November (seasonal rate changes) and therefore create a difference between the monthly amount that shows up on the books and the amount that is calculated after moving the adjusted volumes to the month for which they were adjusted. These adjustments basically make up the remaining difference of $437,773 shown in column 6.

Bay State Gas Company
Unbilled Gas Cost
For the 12 Months Ending 12/31/04

Attachment AG-17-1(a)

	Residential	Commercial	Industrial	Total
January	(715,410)	(282,409)	(164,368)	(1,162,187)
February	3,058,233	866,438	342,396	4,267,067
March	(1,149,883)	(329,322)	68,723	(1,410,482)
April	(9,097,947)	(2,700,038)	(869,198)	(12,667,183)
May	(3,140,557)	(764,076)	(171,390)	(4,076,023)
June	(1,835,008)	(634,458)	(157,785)	(2,627,251)
July	544,915	174,202	335,839	1,054,956
August	210,107	109,632	40,337	360,076
September	710,032	80,400	(3,700)	786,732
October	4,427,902	1,575,677	525,429	6,529,008
November	5,387,059	1,832,703	1,147,272	8,367,034
December	9,047,359	2,890,133	906,832	12,844,324
Total	7,446,802	2,818,882	2,000,387	12,266,071

Bay State Gas Company
Estimated Leap Year Difference
For 3/4 of the Day of February 29, 2004

Attachment to AG-17-1(b)

	3/4 of Feb. Base Load Therms *											
	Brockton Therms	Lawerence Therms	Springfield Therms	Total Therms	Sched	Head Blk Rate	Tail Blk Rate	Sched	Head Blk Rate	Tail Blk Rate	Average Rate	Estimated Revenue
Residential Heat	63,808	22,781	41,593	128,182	R/T-3	0.4000	0.2076	R/T-3	0.4000	0.2076	0.3038	$38,942
Residential Non-Heat	6,025	2,437	8,132	16,594	R/T-1	0.4349	0.3758	R/T-1	0.4349	0.3758	0.4054	6,727
C&I Heat	12,493	3,470	8,314	24,277	G/T-40	0.3694	0.2315	G/T-41	0.1979	0.1572	0.239	5,802
C&I Non-Heat	37,465	9,127	24,106	70,698	G/T-50	0.3597	0.2268	G/T-51	0.1708	0.1315	0.2222	15,709
C&I Heat	11,769	4,689	6,432	22,890	G/T-42	0.1658	0.1317	G/T-43	0.0389	0.0389	0.0938	2,147
C&I Non-Heat	58,461	61,395	67,188	187,044	G/T-52	0.1638	0.1288	G/T-53	0.0389	0.0389	0.0926	17,320
	190,021	103,899	155,765	449,685								$86,647

* From Schedule JAF-1-6, Column 30.

COMMONWEALTH OF MASSACHUSETTS
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RESPONSE OF BAY STATE GAS COMPANY TO THE
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D. T. E. 05-27

Date: June 23, 2005

Responsible: Joseph A. Ferro, Manager Regulatory Policy

AG-17-2 Referring to Exhibit BSG/JAF-1, Schedule JAF-1, Sheet 1, Column 6, Line 4, why are all of the interruptible revenues (and volumes) eliminated from the pro forma annualized revenues and sales?

Response: The test year interruptible sales ("IS") revenues are eliminated from pro forma annualized delivery service revenues and thus, shows up in column 6 as an adjustment to annualized test year revenues, because these IS revenues are not a part of delivery service revenue from which the Company's net revenue is determined and shown on line 24 of Sheet 2 of Schedule JAF-1-1. Because these revenues are not included with GAF revenues, which are deducted from total revenues in the Company's cost of service (see Exhibit/BSG/JES-1, Schedule JES-1 and JES-5.), they need to be deducted as an adjustment to annualized revenues. These IS revenues consist of gas costs (but not included in with GAF revenues) and margins, most of which are passed back to firm sales customers through the Cost of Gas Clause mechanism and have served to reduce GAF revenues.

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RESPONSE OF BAY STATE GAS COMPANY TO THE
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D. T. E. 05-27

Date: June 23, 2005

Responsible: Joseph A. Ferro, Manager Regulatory Policy

AG-17-3 Referring to Exhibit BSG/JAF-1, Schedule JAF-1, Sheet 1, Column 6, please describe how the factors cited on Exhibit BSG/JAF-1, Page 35, Lines 8-9 result in a pro forma "Adjustment to Reflect Annualization" of $15.2 million.

Response: Please see Bay State's response to AG-17-1.

COMMONWEALTH OF MASSACHUSETTS
DEPARTMENT OF TELECOMMUNICATIONS AND ENERGY

RESPONSE OF BAY STATE GAS COMPANY TO THE
SEVENTEENTH SET OF INFORMATION REQUESTS FROM ATTORNEY GENERAL
D. T. E. 05-27

Date: June 23, 2005

Responsible: Joseph A. Ferro, Manager Regulatory Policy

AG-17-4 Please provide a schedule similar to Schedule JAF 1-2, based on actual test year billing determinants and actual rates in effect during each month during the test year. The revenue should equal the total revenue on Schedule JAF1-1, Sheet 1, Column 1, Lines 2-7 or should reconcile. Please also provide all workpapers, calculations, formulas, assumptions, and supporting documentation for the response.

Response: Total revenue on Schedule JAF-1-1, Sheet 1, Column 1, Lines 2-7 is revenue that is booked on the financial statements. There are three reasons why such a schedule cannot be created for per book revenue.

1) Unbilled revenue is calculated for the financial statements by applying weighted average rates by customer class to volumes accumulated on a customer-by-customer basis each month and summarized by rate schedule. Volumes are not stored on a rate block basis.
2) Billed revenue is summarized on a rate schedule basis for financial statements. However as customers are adjusted, adjusted revenue reflects volumes multiplied by the rates in effect during the adjusted volume month. Some adjustments span multiple months and therefore multiple rates. Only the resulting revenue and volumes are stored as backup to the financial statements so it is not possible to split out every adjustment for every customer for every month and show it in a Schedule JAF-1-2 format.
3) Some adjustments are rate only adjustments. In this case the volumes do not change only the rate to which they apply change. (For instance, originally billed on rate G-40 but should have been billed on rate G-41.) These adjustments would also prevent a volume times rate type of format for per books financial statement revenue.

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Date: June 23, 2005

Responsible: Joseph A. Ferro, Manager Regulatory Policy

AG-17-5 Referring to Exhibit BSG/JAF-1, Schedule JAF-1, Sheet 1, Column 3, please itemize the Indirect GAF at Current Rates. The response should identify the revenues associated with each of the items identified on Exhibit BSG/JAF-1, Page 36, Lines 10-17.

Response: Please see Attachment AG-17-5.

Bay State Gas Company
Response to AG-17-5

Description	January	February	March	April	May	June	July	August	September	October	November	December	Total
RESIDENTIAL SALES													
Rate R-1 Residential Non-Heating Bi-Monthly													
Volumes	149,042	126,302	129,262	85,324	78,003	52,336	53,959	51,578	39,599	42,035	38,078	34,529	
Production and Storage Rate	0.0114	0.0114	0.0114	0.0114	0.0057	0.0057	0.0057	0.0057	0.0057	0.0057	0.0138	0.0138	
Production and Storage Revenue	1,699.08	1,439.84	1,473.59	972.69	444.62	298.32	307.57	293.99	225.71	239.60	525.48	476.50	
Working Capital associated with Gas Cost Rate	0.0108	0.0108	0.0108	0.0108	0.0319	0.0319	0.0319	0.0319	0.0319	0.0319	0.0127	0.0127	
Working Capital associated with Gas Cost Revenue	1,609.65	1,364.06	1,396.03	921.50	2,488.30	1,669.52	1,721.29	1,645.34	1,263.21	1,340.92	483.59	438.52	
Bad Debt expense associated with gas cost collections Rate	0.0111	0.0111	0.0111	0.0111	0.0198	0.0198	0.0198	0.0198	0.0198	0.0198	0.0224	0.0224	
Bad Debt expense associated with gas cost collections Revenue	1,654.37	1,401.95	1,434.81	947.10	1,544.46	1,036.25	1,068.39	1,021.24	784.06	832.29	852.95	773.45	
Supplier Refunds Rate	(0.0003)	(0.0003)	(0.0003)	(0.0003)	0.0004	0.0004	0.0004	0.0004	0.0004	0.0004	(0.0025)	(0.0025)	
Supplier Refunds Revenue	(44.71)	(37.89)	(38.78)	(25.60)	31.20	20.93	21.58	20.63	15.84	16.81	(95.20)	(86.32)	
Total Indirect	4,918	4,168	4,266	2,816	4,509	3,025	3,119	2,981	2,289	2,430	1,767	1,602	37,889
Rate R-1 Residential Non-Heating													
Volumes	524,596	459,899	456,340	365,598	343,173	332,931	332,073	335,971	360,738	445,588	501,776	589,799	
Production and Storage Rate	0.0114	0.0114	0.0114	0.0114	0.0057	0.0057	0.0057	0.0057	0.0057	0.0057	0.0138	0.0138	
Production and Storage Revenue	5,980.39	5,242.85	5,202.28	4,167.82	1,956.09	1,897.71	1,892.82	1,915.03	2,056.21	2,539.85	6,924.51	8,139.23	
Working Capital associated with Gas Cost Rate	0.0108	0.0108	0.0108	0.0108	0.0319	0.0319	0.0319	0.0319	0.0319	0.0319	0.0127	0.0127	
Working Capital associated with Gas Cost Revenue	5,665.64	4,966.91	4,928.47	3,948.46	10,947.22	10,620.50	10,593.13	10,717.47	11,507.54	14,214.26	6,372.56	7,490.45	
Bad Debt expense associated with gas cost collections Rate	0.0111	0.0111	0.0111	0.0111	0.0198	0.0198	0.0198	0.0198	0.0198	0.0198	0.0224	0.0224	
Bad Debt expense associated with gas cost collections Revenue	5,823.02	5,104.88	5,065.37	4,058.14	6,794.83	6,592.03	6,575.05	6,652.23	7,142.61	8,822.64	11,239.78	13,211.50	
Supplier Refunds Rate	(0.0003)	(0.0003)	(0.0003)	(0.0003)	0.0004	0.0004	0.0004	0.0004	0.0004	0.0004	(0.0025)	(0.0025)	
Supplier Refunds Revenue	(157.38)	(137.97)	(136.90)	(109.68)	137.27	133.17	132.83	134.39	144.30	178.24	(1,254.44)	(1,474.50)	
Total Indirect	17,312	15,177	15,059	12,065	19,835	19,243	19,194	19,419	20,851	25,755	23,282	27,367	234,559
Rate R-2 Residential Non-Heating - Bi Monthly Low Income													
Volumes	5,692	5,690	6,527	8,528	4,339	3,017	3,136	3,815	2,049	2,992	2,180	3,387	
Production and Storage Rate	0.0114	0.0114	0.0114	0.0114	0.0057	0.0057	0.0057	0.0057	0.0057	0.0057	0.0138	0.0138	
Production and Storage Revenue	64.89	64.87	74.41	97.22	24.73	17.20	17.88	21.75	11.68	17.05	30.08	46.74	
Working Capital associated with Gas Cost Rate	0.0108	0.0108	0.0108	0.0108	0.0319	0.0319	0.0319	0.0319	0.0319	0.0319	0.0127	0.0127	
Working Capital associated with Gas Cost Revenue	61.47	61.45	70.49	92.10	138.41	96.24	100.04	121.70	65.36	95.44	27.69	43.01	
Bad Debt expense associated with gas cost collections Rate	0.0111	0.0111	0.0111	0.0111	0.0198	0.0198	0.0198	0.0198	0.0198	0.0198	0.0224	0.0224	
Bad Debt expense associated with gas cost collections Revenue	63.18	63.16	72.45	94.66	85.91	59.74	62.09	75.54	40.57	59.24	48.83	75.87	
Supplier Refunds Rate	(0.0003)	(0.0003)	(0.0003)	(0.0003)	0.0004	0.0004	0.0004	0.0004	0.0004	0.0004	(0.0025)	(0.0025)	
Supplier Refunds Revenue	(1.71)	(1.71)	(1.96)	(2.56)	1.74	1.21	1.25	1.53	0.82	1.20	(5.45)	(8.47)	
Total Indirect	188	188	215	281	251	174	181	221	118	173	101	157	2,249
Rate R-2 Residential Non-Heat - Low Income													
Volumes	32,340	32,799	37,940	70,540	46,075	24,118	23,345	21,176	25,383	25,615	30,419	44,627	
Production and Storage Rate	0.0114	0.0114	0.0114	0.0114	0.0057	0.0057	0.0057	0.0057	0.0057	0.0057	0.0138	0.0138	
Production and Storage Revenue	368.68	373.91	432.52	804.16	262.63	137.47	133.07	120.70	144.68	146.01	419.78	615.85	
Working Capital associated with Gas Cost Rate	0.0108	0.0108	0.0108	0.0108	0.0319	0.0319	0.0319	0.0319	0.0319	0.0319	0.0127	0.0127	
Working Capital associated with Gas Cost Revenue	349.27	354.23	409.75	761.83	1,469.79	769.36	744.71	675.51	809.72	817.12	386.32	566.76	
Bad Debt expense associated with gas cost collections Rate	0.0111	0.0111	0.0111	0.0111	0.0198	0.0198	0.0198	0.0198	0.0198	0.0198	0.0224	0.0224	
Bad Debt expense associated with gas cost collections Revenue	358.97	364.07	421.13	782.99	912.29	477.54	462.23	419.28	502.58	507.18	681.39	999.64	
Supplier Refunds Rate	(0.0003)	(0.0003)	(0.0003)	(0.0003)	0.0004	0.0004	0.0004	0.0004	0.0004	0.0004	(0.0025)	(0.0025)	
Supplier Refunds Revenue	(9.70)	(9.84)	(11.38)	(21.16)	18.43	9.65	9.34	8.47	10.15	10.25	(76.05)	(111.57)	
Total Indirect	1,067	1,082	1,252	2,328	2,663	1,394	1,349	1,224	1,467	1,481	1,411	2,071	18,790
Rate R-3 Residential Heating													
Volumes	42,541,598	36,166,741	30,885,387	18,511,103	8,833,254	5,396,048	4,848,641	4,879,820	5,629,527	12,071,022	21,857,821	34,939,576	
Production and Storage Rate	0.0270	0.0270	0.0270	0.0270	0.0052	0.0052	0.0052	0.0052	0.0052	0.0052	0.0298	0.0298	
Production and Storage Revenue	1,148,623.15	976,502.01	833,905.45	499,799.78	45,932.92	28,059.45	25,212.93	25,375.06	29,273.54	62,769.31	651,363.07	1,041,199.36	
Working Capital associated with Gas Cost Rate	0.0108	0.0108	0.0108	0.0108	0.0319	0.0319	0.0319	0.0319	0.0319	0.0319	0.0127	0.0127	
Working Capital associated with Gas Cost Revenue	459,449.26	390,600.80	333,562.18	199,919.91	281,780.80	172,133.93	154,671.65	155,666.26	179,581.91	385,065.60	277,594.33	443,732.62	
Bad Debt expense associated with gas cost collections Rate	0.0111	0.0111	0.0111	0.0111	0.0198	0.0198	0.0198	0.0198	0.0198	0.0198	0.0224	0.0224	
Bad Debt expense associated with gas cost collections Revenue	472,211.74	401,450.83	342,827.80	205,473.24	174,898.43	106,841.75	96,003.09	96,620.44	111,464.63	239,006.24	489,615.19	782,646.50	
Supplier Refunds Rate	(0.0003)	(0.0003)	(0.0003)	(0.0003)	0.0004	0.0004	0.0004	0.0004	0.0004	0.0004	(0.0025)	(0.0025)	
Supplier Refunds Revenue	(12,762.48)	(10,850.02)	(9,265.62)	(5,553.33)	3,533.30	2,158.42	1,939.46	1,951.93	2,251.81	4,828.41	(54,644.55)	(87,348.94)	
Total Indirect	2,067,522	1,757,704	1,501,030	899,640	506,145	309,194	277,827	279,614	322,572	691,670	1,363,928	2,180,230	12,157,074

Bay State Gas Company
Response to AG-17-5

Description	January	February	March	April	May	June	July	August	September	October	November	December	Total

Bay State Gas Company
Response to AG-17-5

Description	January	February	March	April	May	June	July	August	September	October	November	December	Total
Rate R-4 Residential Heating - Low Income													
Volumes	3,745,595	3,380,565	3,474,768	2,087,713	1,339,680	557,199	447,652	418,151	471,004	931,518	1,634,348	2,655,009	
Production and Storage Rate	0.0270	0.0270	0.0270	0.0270	0.0052	0.0052	0.0052	0.0052	0.0052	0.0052	0.0298	0.0298	
Production and Storage Revenue	101,131.07	91,275.26	93,818.74	56,368.25	6,966.34	2,897.43	2,327.79	2,174.39	2,449.22	4,843.89	48,703.57	79,119.27	
Working Capital associated with Gas Cost Rate	0.0108	0.0108	0.0108	0.0108	0.0319	0.0319	0.0319	0.0319	0.0319	0.0319	0.0127	0.0127	
Working Capital associated with Gas Cost Revenue	40,452.43	36,510.10	37,527.49	22,547.30	42,735.79	17,774.65	14,280.10	13,339.02	15,025.03	29,715.42	20,756.22	33,718.61	
Bad Debt expense associated with gas cost collections Rate	0.0111	0.0111	0.0111	0.0111	0.0198	0.0198	0.0198	0.0198	0.0198	0.0198	0.0224	0.0224	
Bad Debt expense associated with gas cost collections Revenue	41,576.10	37,524.27	38,569.92	23,173.61	26,525.66	11,032.54	8,863.51	8,279.39	9,325.88	18,444.06	36,609.40	59,472.20	
Supplier Refunds Rate	(0.0003)	(0.0003)	(0.0003)	(0.0003)	0.0004	0.0004	0.0004	0.0004	0.0004	0.0004	(0.0025)	(0.0025)	
Supplier Refunds Revenue	(1,123.68)	(1,014.17)	(1,042.43)	(626.31)	535.87	222.88	179.06	167.26	188.40	372.61	(4,085.87)	(6,637.52)	
Total Indirect	182,036	164,295	168,874	101,463	76,764	31,928	25,650	23,960	26,989	53,376	101,983	165,673	1,122,990
Rate L-60 Outdoor Lighting													
Volumes	252	218	241	235	220	188	208	229	230	258	250	199	
Production and Storage Rate	0.0054	0.0054	0.0054	0.0054	0.0079	0.0079	0.0079	0.0079	0.0079	0.0079	0.0106	0.0106	
Production and Storage Revenue	1.36	1.18	1.30	1.27	1.74	1.49	1.64	1.81	1.82	2.04	2.65	2.11	
Working Capital associated with Gas Cost Rate	0.0108	0.0108	0.0108	0.0108	0.0319	0.0319	0.0319	0.0319	0.0319	0.0319	0.0127	0.0127	
Working Capital associated with Gas Cost Revenue	2.72	2.35	2.60	2.54	7.02	6.00	6.64	7.31	7.34	8.23	3.18	2.53	
Bad Debt expense associated with gas cost collections Rate	0.0111	0.0111	0.0111	0.0111	0.0198	0.0198	0.0198	0.0198	0.0198	0.0198	0.0224	0.0224	
Bad Debt expense associated with gas cost collections Revenue	2.80	2.42	2.68	2.61	4.36	3.72	4.12	4.53	4.55	5.11	5.60	4.46	
Supplier Refunds Rate	(0.0003)	(0.0003)	(0.0003)	(0.0003)	0.0004	0.0004	0.0004	0.0004	0.0004	0.0004	(0.0025)	(0.0025)	
Supplier Refunds Revenue	(0.08)	(0.07)	(0.07)	(0.07)	0.09	0.08	0.08	0.09	0.09	0.10	(0.63)	(0.50)	
Total Indirect	7	6	7	6	13	11	12	14	14	15	11	9	125
Rate G-40 C&I Low Annual / High Winter													
Volumes	5,249,954	4,500,696	3,460,826	1,793,588	587,016	289,410	218,941	245,666	313,163	780,194	2,018,855	3,852,901	
Production and Storage Rate	0.0239	0.0239	0.0239	0.0239	0.0039	0.0039	0.0039	0.0039	0.0039	0.0039	0.0286	0.0286	
Production and Storage Revenue	125,473.90	107,566.63	82,713.74	42,866.75	2,289.36	1,128.70	853.87	958.10	1,221.34	3,042.76	57,739.25	110,192.97	
Working Capital associated with Gas Cost Rate	0.0108	0.0108	0.0108	0.0108	0.0319	0.0319	0.0319	0.0319	0.0319	0.0319	0.0127	0.0127	
Working Capital associated with Gas Cost Revenue	56,699.50	48,607.52	37,376.92	19,370.75	18,725.81	9,232.18	6,984.22	7,836.75	9,989.90	24,888.19	25,639.46	48,931.84	
Bad Debt expense associated with gas cost collections Rate	0.0111	0.0111	0.0111	0.0111	0.0198	0.0198	0.0198	0.0198	0.0198	0.0198	0.0224	0.0224	
Bad Debt expense associated with gas cost collections Revenue	58,274.49	49,957.73	38,415.17	19,908.83	11,622.92	5,730.32	4,335.03	4,864.19	6,200.63	15,447.84	45,222.35	86,304.98	
Supplier Refunds Rate	(0.0003)	(0.0003)	(0.0003)	(0.0003)	0.0004	0.0004	0.0004	0.0004	0.0004	0.0004	(0.0025)	(0.0025)	
Supplier Refunds Revenue	(1,574.99)	(1,350.21)	(1,038.25)	(538.08)	234.81	115.76	87.58	98.27	125.27	312.08	(5,047.14)	(9,632.25)	
Total Indirect	238,873	204,782	157,468	81,608	32,873	16,207	12,261	13,757	17,537	43,691	123,554	235,798	1,178,408
Rate G-50 C&I Low Annual / Low Winter													
Volumes	515,282	454,502	458,448	370,998	357,718	280,042	262,569	273,997	297,972	361,734	368,490	444,452	
Production and Storage Rate	0.0185	0.0185	0.0185	0.0185	0.0061	0.0061	0.0061	0.0061	0.0061	0.0061	0.0255	0.0255	
Production and Storage Revenue	9,532.72	8,408.29	8,481.29	6,863.46	2,182.08	1,708.26	1,601.67	1,671.38	1,817.63	2,206.58	9,396.50	11,333.53	
Working Capital associated with Gas Cost Rate	0.0108	0.0108	0.0108	0.0108	0.0319	0.0319	0.0319	0.0319	0.0319	0.0319	0.0127	0.0127	
Working Capital associated with Gas Cost Revenue	5,565.05	4,908.62	4,951.24	4,006.78	11,411.20	8,933.34	8,375.95	8,740.50	9,505.31	11,539.31	4,679.82	5,644.54	
Bad Debt expense associated with gas cost collections Rate	0.0111	0.0111	0.0111	0.0111	0.0198	0.0198	0.0198	0.0198	0.0198	0.0198	0.0224	0.0224	
Bad Debt expense associated with gas cost collections Revenue	5,719.63	5,044.97	5,088.77	4,118.08	7,082.82	5,544.83	5,198.87	5,425.14	5,899.85	7,162.33	8,254.18	9,955.72	
Supplier Refunds Rate	(0.0003)	(0.0003)	(0.0003)	(0.0003)	0.0004	0.0004	0.0004	0.0004	0.0004	0.0004	(0.0025)	(0.0025)	
Supplier Refunds Revenue	(154.58)	(136.35)	(137.53)	(111.30)	143.09	112.02	105.03	109.60	119.19	144.69	(921.23)	(1,111.13)	
Total Indirect	20,663	18,226	18,384	14,877	20,819	16,298	15,282	15,947	17,342	21,053	21,409	25,823	226,122
Rate G-41 C&I Medium Annual / High Winter													
Volumes	7,979,880	6,985,265	5,860,135	3,207,490	1,257,815	579,484	523,448	464,315	596,432	1,702,902	3,406,616	6,072,697	
Production and Storage Rate	0.0233	0.0233	0.0233	0.0233	0.0064	0.0064	0.0064	0.0064	0.0064	0.0064	0.0253	0.0253	
Production and Storage Revenue	185,931.20	162,756.67	136,541.15	74,734.52	8,050.02	3,708.70	3,350.07	2,971.62	3,817.16	10,898.57	86,187.38	153,639.23	
Working Capital associated with Gas Cost Rate	0.0108	0.0108	0.0108	0.0108	0.0319	0.0319	0.0319	0.0319	0.0319	0.0319	0.0127	0.0127	
Working Capital associated with Gas Cost Revenue	86,182.70	75,440.86	63,289.46	34,640.89	40,124.30	18,485.54	16,697.99	14,811.65	19,026.18	54,322.57	43,264.02	77,123.25	
Bad Debt expense associated with gas cost collections Rate	0.0111	0.0111	0.0111	0.0111	0.0198	0.0198	0.0198	0.0198	0.0198	0.0198	0.0224	0.0224	
Bad Debt expense associated with gas cost collections Revenue	88,576.67	77,536.44	65,047.50	35,603.14	24,904.74	11,473.78	10,364.27	9,193.44	11,809.35	33,717.46	76,308.20	136,028.41	
Supplier Refunds Rate	(0.0003)	(0.0003)	(0.0003)	(0.0003)	0.0004	0.0004	0.0004	0.0004	0.0004	0.0004	(0.0025)	(0.0025)	
Supplier Refunds Revenue	(2,393.96)	(2,095.58)	(1,758.04)	(962.25)	503.13	231.79	209.38	185.73	238.57	681.16	(8,516.54)	(15,181.74)	
Total Indirect	358,297	313,638	263,120	144,016	73,582	33,900	30,622	27,162	34,891	99,620	197,243	351,609	1,927,701

Bay State Gas Company
Response to AG-17-5

Description	January	February	March	April	May	June	July	August	September	October	November	December	Total
Rate G-51 C&I Medium Annual / Low Winter													
Volumes	1,573,316	1,337,421	1,294,426	1,140,036	959,677	865,016	875,764	875,516	910,547	1,115,861	1,277,952	1,493,375	
Production and Storage Rate	0.0123	0.0123	0.0123	0.0123	0.0068	0.0068	0.0068	0.0068	0.0068	0.0068	0.0178	0.0178	
Production and Storage Revenue	19,351.79	16,450.28	15,921.44	14,022.44	6,525.80	5,882.11	5,955.20	5,953.51	6,191.72	7,587.85	22,747.55	26,582.08	
Working Capital associated with Gas Cost Rate	0.0108	0.0108	0.0108	0.0108	0.0319	0.0319	0.0319	0.0319	0.0319	0.0319	0.0127	0.0127	
Working Capital associated with Gas Cost Revenue	16,991.81	14,444.15	13,979.80	12,312.39	30,613.70	27,594.01	27,936.87	27,928.96	29,046.45	35,595.97	16,229.99	18,965.86	
Bad Debt expense associated with gas cost collections Rate	0.0111	0.0111	0.0111	0.0111	0.0198	0.0198	0.0198	0.0198	0.0198	0.0198	0.0224	0.0224	
Bad Debt expense associated with gas cost collections Revenue	17,463.81	14,845.37	14,368.13	12,654.40	19,001.60	17,127.32	17,340.13	17,335.22	18,028.83	22,094.05	28,626.12	33,451.60	
Supplier Refunds Rate	(0.0003)	(0.0003)	(0.0003)	(0.0003)	0.0004	0.0004	0.0004	0.0004	0.0004	0.0004	(0.0025)	(0.0025)	
Supplier Refunds Revenue	(471.99)	(401.23)	(388.33)	(342.01)	383.87	346.01	350.31	350.21	364.22	446.34	(3,194.88)	(3,733.44)	
Total Indirect	53,335	45,339	43,881	38,647	56,525	50,949	51,583	51,568	53,631	65,724	64,409	75,266	650,857
Rate G-42 C&I High Annual / High Winter													
Volumes	3,223,246	2,865,142	2,706,359	1,585,628	717,253	333,487	272,789	291,769	403,059	865,611	1,536,441	2,682,904	
Production and Storage Rate	0.0227	0.0227	0.0227	0.0227	0.0076	0.0076	0.0076	0.0076	0.0076	0.0076	0.0246	0.0246	
Production and Storage Revenue	73,167.68	65,038.72	61,434.35	35,993.76	5,451.12	2,534.50	2,073.20	2,217.44	3,063.25	6,578.64	37,796.45	65,999.44	
Working Capital associated with Gas Cost Rate	0.0108	0.0108	0.0108	0.0108	0.0319	0.0319	0.0319	0.0319	0.0319	0.0319	0.0127	0.0127	
Working Capital associated with Gas Cost Revenue	34,811.06	30,943.53	29,228.68	17,124.78	22,880.37	10,638.24	8,701.97	9,307.43	12,857.58	27,612.99	19,512.80	34,072.88	
Bad Debt expense associated with gas cost collections Rate	0.0111	0.0111	0.0111	0.0111	0.0198	0.0198	0.0198	0.0198	0.0198	0.0198	0.0224	0.0224	
Bad Debt expense associated with gas cost collections Revenue	35,778.03	31,803.08	30,040.58	17,600.47	14,201.61	6,603.04	5,401.22	5,777.03	7,980.57	17,139.10	34,416.28	60,097.05	
Supplier Refunds Rate	(0.0003)	(0.0003)	(0.0003)	(0.0003)	0.0004	0.0004	0.0004	0.0004	0.0004	0.0004	(0.0025)	(0.0025)	
Supplier Refunds Revenue	(966.97)	(859.54)	(811.91)	(475.69)	286.90	133.39	109.12	116.71	161.22	346.24	(3,841.10)	(6,707.26)	
Total Indirect	142,790	126,926	119,892	70,243	42,820	19,909	16,286	17,419	24,063	51,677	87,884	153,462	873,370
Rate G-52 C&I High Annual / Low Winter													
Volumes	695,711	564,964	693,462	522,181	429,678	423,373	399,538	581,401	437,425	589,893	581,826	746,439	
Production and Storage Rate	0.0103	0.0103	0.0103	0.0103	0.0096	0.0096	0.0096	0.0096	0.0096	0.0096	0.0211	0.0211	
Production and Storage Revenue	7,165.82	5,819.13	7,142.66	5,378.46	4,124.91	4,064.38	3,835.56	5,581.45	4,199.28	5,662.97	12,276.53	15,749.86	
Working Capital associated with Gas Cost Rate	0.0108	0.0108	0.0108	0.0108	0.0319	0.0319	0.0319	0.0319	0.0319	0.0319	0.0127	0.0127	
Working Capital associated with Gas Cost Revenue	7,513.68	6,101.61	7,489.39	5,639.55	13,706.73	13,505.60	12,745.26	18,546.69	13,953.86	18,817.59	7,389.19	9,479.78	
Bad Debt expense associated with gas cost collections Rate	0.0111	0.0111	0.0111	0.0111	0.0198	0.0198	0.0198	0.0198	0.0198	0.0198	0.0224	0.0224	
Bad Debt expense associated with gas cost collections Revenue	7,722.39	6,271.10	7,697.43	5,796.21	8,507.62	8,382.79	7,910.85	11,511.74	8,661.02	11,679.88	13,032.90	16,720.23	
Supplier Refunds Rate	(0.0003)	(0.0003)	(0.0003)	(0.0003)	0.0004	0.0004	0.0004	0.0004	0.0004	0.0004	(0.0025)	(0.0025)	
Supplier Refunds Revenue	(208.71)	(169.49)	(208.04)	(156.65)	171.87	169.35	159.82	232.56	174.97	235.96	(1,454.57)	(1,866.10)	
Total Indirect	22,193	18,022	22,121	16,658	26,511	26,122	24,651	35,872	26,989	36,396	31,244	40,084	326,865
Rate G-43 C&I Extra High Annual / High Winter													
Volumes	860,842	710,357	723,982	484,696	261,790	160,565	168,786	171,458	195,824	344,826	150,414	198,406	
Production and Storage Rate	0.0227	0.0227	0.0227	0.0227	0.0076	0.0076	0.0076	0.0076	0.0076	0.0076	0.0246	0.0246	
Production and Storage Revenue	19,541.11	16,125.10	16,434.39	11,002.60	1,989.60	1,220.29	1,282.77	1,303.08	1,488.26	2,620.68	3,700.18	4,880.79	
Working Capital associated with Gas Cost Rate	0.0108	0.0108	0.0108	0.0108	0.0319	0.0319	0.0319	0.0319	0.0319	0.0319	0.0127	0.0127	
Working Capital associated with Gas Cost Revenue	9,297.09	7,671.86	7,819.01	5,234.72	8,351.10	5,122.02	5,384.27	5,469.51	6,246.79	10,999.95	1,910.26	2,519.76	
Bad Debt expense associated with gas cost collections Rate	0.0111	0.0111	0.0111	0.0111	0.0198	0.0198	0.0198	0.0198	0.0198	0.0198	0.0224	0.0224	
Bad Debt expense associated with gas cost collections Revenue	9,555.35	7,884.96	8,036.20	5,380.13	5,183.44	3,179.19	3,341.96	3,394.87	3,877.32	6,827.55	3,369.27	4,444.29	
Supplier Refunds Rate	(0.0003)	(0.0003)	(0.0003)	(0.0003)	0.0004	0.0004	0.0004	0.0004	0.0004	0.0004	(0.0025)	(0.0025)	
Supplier Refunds Revenue	(258.25)	(213.11)	(217.19)	(145.41)	104.72	64.23	67.51	68.58	78.33	137.93	(376.04)	(496.02)	
Total Indirect	38,135	31,469	32,072	21,472	15,629	9,586	10,077	10,236	11,691	20,586	8,604	11,349	220,905
Rate G-53 C&I Extra High Annual / Low Winter													
Volumes	387,755	273,520	232,277	234,924	184,364	136,053	123,490	130,334	144,532	148,236	494,126	664,386	
Production and Storage Rate	0.0103	0.0103	0.0103	0.0103	0.0096	0.0096	0.0096	0.0096	0.0096	0.0096	0.0211	0.0211	
Production and Storage Revenue	3,993.88	2,817.26	2,392.45	2,419.72	1,769.89	1,306.11	1,185.50	1,251.21	1,387.51	1,423.07	10,426.06	14,018.54	
Working Capital associated with Gas Cost Rate	0.0108	0.0108	0.0108	0.0108	0.0319	0.0319	0.0319	0.0319	0.0319	0.0319	0.0127	0.0127	
Working Capital associated with Gas Cost Revenue	4,187.75	2,954.02	2,508.59	2,537.18	5,881.21	4,340.09	3,939.33	4,157.65	4,610.57	4,728.73	6,275.40	8,437.70	
Bad Debt expense associated with gas cost collections Rate	0.0111	0.0111	0.0111	0.0111	0.0198	0.0198	0.0198	0.0198	0.0198	0.0198	0.0224	0.0224	
Bad Debt expense associated with gas cost collections Revenue	4,304.08	3,036.07	2,578.27	2,607.66	3,650.41	2,693.85	2,445.10	2,580.61	2,861.73	2,935.07	11,068.42	14,882.25	
Supplier Refunds Rate	(0.0003)	(0.0003)	(0.0003)	(0.0003)	0.0004	0.0004	0.0004	0.0004	0.0004	0.0004	(0.0025)	(0.0025)	
Supplier Refunds Revenue	(116.33)	(82.06)	(69.68)	(70.48)	73.75	54.42	49.40	52.13	57.81	59.29	(1,235.32)	(1,660.97)	
Total Indirect	12,369	8,725	7,410	7,494	11,375	8,394	7,619	8,042	8,918	9,146	26,535	35,678	151,705
Total Indirect Gas Cost	3,159,705	2,709,746	2,355,050	1,413,614	890,315	546,335	495,713	507,435	569,361	1,122,793	2,053,366	3,306,175	19,129,607

Bay State Gas Company
Response to AG-17-5

Description	January	February	March	April	May	June	July	August	September	October	November	December	Total

COMMONWEALTH OF MASSACHUSETTS
DEPARTMENT OF TELECOMMUNICATIONS AND ENERGY

RESPONSE OF BAY STATE GAS COMPANY TO THE
SEVENTEENTH SET OF INFORMATION REQUESTS FROM ATTORNEY GENERAL

D. T. E. 05-27

Date: June 23, 2005

Responsible: Joseph A. Ferro, Manager Regulatory Policy

AG-17-6 Referring to Exhibit BSG/JAF-1, Schedule JAF-1, Sheet 1, Column 4, please itemize the Annualized DAF at Current Rates. The response should identify the revenues associated with each of the items identified on Exhibit BSG/JAF-1, Page 37, Lines 1-6.

Response: Please see Attachment AG-17-6.

COMMONWEALTH OF MASSACHUSETTS
DEPARTMENT OF TELECOMMUNICATIONS AND ENERGY

RESPONSE OF BAY STATE GAS COMPANY TO THE
SEVENTEENTH SET OF INFORMATION REQUESTS FROM ATTORNEY GENERAL
D. T. E. 05-27

Date: June 23, 2005

Responsible: Joseph A. Ferro, Manager Regulatory Policy

AG-17-7 Please itemize the revenues included in Accounts 488, 493, and 495 on Exhibit BSG/JAF-1, Schedule JAF-1, Sheet 1. The response should show dollar amount of each item of revenue included in these accounts.

Response: Please see Attachment AG-17-7.

Bay State Gas Company
Response to AG-17-7
For the 12 Months ending December 31, 2004

Attachment AG-17-7

Description	Account	Total
Account 488		
Rental Revenue - WH - taxable	648801	(4,859,235.48)
Rental Revenue - HH - taxable	648803	(1,725,262.33)
Rental Revenue Late Payment CH-CB & OT	648805	(239,957.33)
Total Rental Revenue		(6,824,455.14)
Account 493		
Rent from Gas Property	649300	(17,331.11)
LNG Tank Lease Revenue	649301	(625,000.00)
I / C Throughput and Rental	649303	0.00
I / C Rent to Maine	649376	(403,274.00)
I / C Rent to New Hampshire	649377	(467,728.00)
Gas Property Revenue		(1,513,333.11)
Account 495		
Bundled Margin	649506	(3,874,466.82)
Special Deals Margin - TCO051	649550	0.00
Off System Sales		(3,874,466.82)
GC Gasline Prot Rev	688217	(106,773.15)
Rev GC Com Plans	688218	(11,742.68)
Late Payment Charge - GC	688219	(69,082.84)
Rev GC Basic-HH	688223	(354,510.64)
Rev GC Basic-WH/HH	688224	(303,360.89)
Rev GC Plus-HH	688225	(2,132,241.49)
Rev GC Plus-WH/HH	688226	(2,468,771.81)
Rev GC Plus-Plans	688227	(167,350.80)
Guardian Care Revenue		(5,613,834.30)
I/C Propane Service Work	642220	0.00
Rev C/S LBR	688201	(60,455.89)
Rev C/S Part Tx	688202	(42,970.92)
Rev C/S Part Nt	688203	15,003.20
Rev C/S WH-LBR	688231	(75,437.45)
Rev C/S DRY-LBR	688232	(285.00)
Rev C/S HH-LBR	688233	(738,795.84)
Rev C/S Oth-LBR	688234	(27,431.29)
Rev C/S WH-Part Tx	688241	(13,821.09)
Rev C/S DRY-Part Tx	688242	(229.81)
Rev C/S HH-Part Tx	688243	(275,245.16)
Rev C/S HH-Oth Part Tx	688244	(11,132.50)
Rev C/S WH-Part Nt	688251	559.46
Rev C/S HH-Part Nt	688253	16,776.85
Rev C/S Oth-Part Nt	688254	(269.46)
Repair Work		(1,213,734.90)
Rev C/ S An Insp	688229	(694,665.74)
Rev C/ S A/C Inspect - Labor	688230	(147,547.42)
Rev C/ S Inspection-Parts	688239	(16,191.47)
Rev C/ S A/C Inspection-Parts	688240	(4,962.64)
Inspection Revenue		(863,367.27)
Carrying Costs-Pre Tax of Ret	649526	988,819.00
Prod & Storage Revenues	649527	(1,044,923.89)
Int Transportation Revenues	649570	208.00
Meter Shop Revenues	649304	218.71

COMMONWEALTH OF MASSACHUSETTS
DEPARTMENT OF TELECOMMUNICATIONS AND ENERGY

RESPONSE OF BAY STATE GAS COMPANY TO THE
ELEVENTH SET OF INFORMATION REQUESTS FROM THE ATTORNEY GENERAL
D. T. E. 05-27

Date: June 23, 2005

Responsible: John E. Skirtich, Consultant (Revenue Requirements)

AG-19-26 Referring to the Company's response to Information Request AG-1-53, please indicate the reasons that the majority of the vehicles listed in the response indicate both a monthly lease payment as well as an acquisition cost. If only one was supposed to be listed for each vehicle, please provide a supplemental response, which indicates the one appropriate cost or payment.

Response: The dollars that appear in the Acquisition Cost column for a leased vehicle represents either the purchase price on newer vehicles or the buyout price of the lease for older vehicles. The ones noted as leased are leased, and the lease payments are included in the cost of service. The Acquisition Cost for the lease vehicles is for information only and is maintained in the database for company vehicles.

COMMONWEALTH OF MASSACHUSETTS
DEPARTMENT OF TELECOMMUNICATIONS AND ENERGY

RESPONSE OF BAY STATE GAS COMPANY TO THE
NINETEENTH SET OF INFORMATION REQUESTS FROM THE ATTORNEY GENERAL
D. T. E. 05-27

Date: June 23, 2005

Responsible: John E. Skirtich, Consultant (Revenue Requirement)

AG-19-36 Referring to the Company's response to Information Request AG-1-93, please indicate whether the General Counsel Retainer Services referred to in that response were put out to bid.

Response: The General Counsel Retainer Services were not put to bid in the test year.

COMMONWEALTH OF MASSACHUSETTS
DEPARTMENT OF TELECOMMUNICATIONS AND ENERGY

RESPONSE OF BAY STATE GAS COMPANY TO THE
TWENTY-SECOND SET OF INFORMATION REQUESTS FROM THE ATTORNEY GENERAL
D. T. E. 05-27

Date: June 23, 2005

Responsible: Danny G. Cote, General Manager

AG-22-52 Explain the procedures employed by the Company to ensure that its system maps are current and continually updated. Provide copies of related Company policies and applicable laws and regulations.

Response: Bay State employs five full time drafting technicians who are responsible for receiving completed work orders and posting that information on operating maps.

To measure progress and ensure timeliness, work orders are tracked via spreadsheets and databases to monitor when paperwork is received in mapping and when data from the work orders has been posted to the proper maps. Monthly statistics are gathered to determine quantities of work orders on file to be mapped and the average duration it takes to put a work order's data on operating maps.

Updates of electronic and paper map copies are distributed on a regular basis. At the offices where drafting technicians work, up-to-date paper copies are kept on file to be used as necessary.

Please see Attachment AG-22-52.

Applicable Laws & Regulations

220 CMR 109.00: DESIGN, CONSTRUCTION, OPERATION, AND MAINTENANCE OF INTRASTATE PIPELINES OPERATING IN EXCESS OF 200 PSIG

109.07: Pipeline Location Marking

(2) The operator shall maintain drawings or plans showing the actual location of the pipeline, valves, pressure regulating stations, and any other pipeline facilities. The drawings or plans shall be updated whenever any changes are made to the pipeline. Each pipeline and its routing shall be reviewed in the field at least once each calendar year, but at intervals not to exceed 15 months, to determine whether the drawings or plans must be revised. The annual review shall be documented. Maps indicating the route of the pipeline shall be given to the fire department and public works department of each municipality through which the pipeline passes. Updated maps, whenever prepared, shall also be provided.

Response:
Bay State Gas has small amounts of pipeline operating in excess of 200 PSIG. Those pipelines were installed over a decade ago. Since then, we have continued to maintain those pipeline segments, but we have not relocated pipe segments that would require a map change. As such, we have not needed to issue revised maps.

Bay State Gas Procedures

From *Bay State Gas / Northern Utilities Emergency Procedures* – under the procedure for Emergency Shut Down Operation of Critical Valves.
"Each division must maintain a complete, up to date set of maps detailing the distribution network."

Response:

Updates of electronic and paper map copies are distributed on a regular basis. At the offices where drafting technicians work, up-to-date paper copies are kept on file to be used as necessary.

COMMONWEALTH OF MASSACHUSETTS
DEPARTMENT OF TELECOMMUNICATIONS AND ENERGY

RESPONSE OF BAY STATE GAS COMPANY TO THE
TWENTY-THIRD SET OF INFORMATION REQUESTS FROM THE ATTORNEY GENERAL
D. T. E. 05-27

Date: June 23, 2005

Responsible: Danny G. Cote, General Manager

AG-23-5 Please identify the manufacture by name, address and phone number of the unprotected coated steel mains that Company has replaced since 1990 in Brockton and Lawrence. Has the Company ever contacted the manufacturer of these unprotected coated steel pipes (or the company responsible for the coatings) regarding leaks, regardless of whether the Company submitted a formal warranty claim? Describe the results of any discussions and produce all documents related to contact with the manufacturer(s).

Response: The Company does not have records that identify the manufacturer of the coated unprotected pipe in Bay State's system.

COMMONWEALTH OF MASSACHUSETTS
DEPARTMENT OF TELECOMMUNICATIONS AND ENERGY

RESPONSE OF BAY STATE GAS COMPANY TO THE
TWENTY-THIRD SET OF INFORMATION REQUESTS FROM THE ATTORNEY GENERAL
D. T. E. 05-27

Date: June 23, 2005

Responsible: Danny G. Cote, General Manager

AG-23-8 Please refer to the June 17, 2005, letter from the Company to the Attorney General regarding overdue discovery responses, Attachment D, page 8. Provide the definitions for all the column headings.

Response: Page 8 of the D.O.T. Additions Report wwrpt052.p is a summary of the footage of the new pipe installed by size and type of pipe.

The column definitions are as follows:

Size:	size of pipe installed
Bare Steel:	(BS) bare steel pipe
Cast Iron:	(CI) cast iron pipe
Copper:	(CO)
Protected C:	(CP) protected coated steel. New category implemented in April 2005 to segregate protected from unprotected coated steel.
Coated Steel:	(CS) Coated Steel. Previously used for both unprotected and protected coated steel. No longer available as of April 2005.
HD Plstc:	(HD) PE 3408 high density polyethylene pipe
Plstc Ins:	(PI) Plastic insert. Older pipe that has been inserted with plastic
Plastic:	(PP) Plastic pipe
Screw End:	(SE)
Stnlss Stl:	(SS) Stainless steel
Unprotected:	(UC) unprotected coated steel. New category implemented in April 2005 to segregate protected from unprotected coated steel.
Totals:	total footage by size installed

COMMONWEALTH OF MASSACHUSETTS
DEPARTMENT OF TELECOMMUNICATIONS AND ENERGY

RESPONSE OF BAY STATE GAS COMPANY TO THE
TWENTY-THIRD SET OF INFORMATION REQUESTS FROM ATTORNEY GENERAL
D. T. E. 05-27

Date: June 23, 2005

Responsible: Danny G. Cote, General Manager

AG-23-10 Produce a copy of the Company's Corrosion Monitoring Program manual and any reports related to the monitoring program.

Response: As stated in other responses, Bay State monitors corrosion on its cathodically protected coated steel infrastructure through corrosion testing and surveys. It monitors corrosion in its unprotected system through active monitoring, which is a frequency of leak surveying that exceeds state and federal standards, as well as other activities.

The Company's corrosion monitoring program is described in Chapter 7 of the Company's Operating & Maintenance Procedures (O&M) Manual. Most noteworthy of all the procedures is O&M Procedure 7.80. Every time a pipe is exposed for any reason, the crew observes the condition of the pipe and the coating, when such exists, and documents their findings. In addition, several other corrosion-monitoring and corrosion-control procedures are part of the Company's overall program. All three of the Company's Massachusetts service territories use this program. Company records indicate that the corrosion monitoring program was formally incorporated into the O&M manual in 1978. Attachment AG-23-10 provides a list of specific procedures which form the program, dates of previous, additions, deletions and revisions, and the effective date of the current procedure. Currently, the Company has a coupon-sampling program for cast iron material only. 220 CMR 113.00 requires the company to capture mechanical properties of its cast iron pipe. To meet this requirement, a cast iron coupon is taken from the pipe whenever (1) installing a new service, (2) performing a tie-in or retiring a cast iron main, and (3) performing a bag-off operation for any reason. Both the internal and external condition of the pipe is observed and documented. If graphitization is observed, the main segment is scheduled for replacement. The corrosion portion of our O&M Manual can be found in response to AG 6-1. The entire O&M Manual has also been provided in earlier requests.

As stated in AG 2-10, in the state of Massachusetts we monitor approximately 5,300 services and 2,037 miles of main with corrosion surveys on an annual basis. The 2,037 miles of main are broken down into approximately 4,000 segments, which could have multiple test locations on each that would also need to be tested. If we copy the results of one year of Massachusetts corrosion testing, a conservative estimate would be 30,000 sheets of paper. Not only are the materials voluminous, they are integral to the on-going safety and integrity of Bay State's operations. All of our corrosion test results are filed within their

respective service territories and are available at any time for the Attorney General's review.

Procedure No.	Procedure Title	Effective Date of Most Recent Procedure	Dates of Previous Additions, Deletions & Revisions
1.06	Reporting Safety-Related Conditions	12/31/02	5/15/97, 11/8/95, 9/29/88
2.02	Transmission Line Patrolling & Continual Surveillance	12/31/02	7/31/00
2.05	Transmission Line - General Requirements for Repair Procedures	7/28/00	
2.08	Transmission Line - Permanent Field Repair of Leaks	7/28/00	
4.20	Replacement of Cast Iron Mains	4/22/96	11/8/95, 4/4/94, 7/30/92, 10/12/91, 8/1/91, 7/1/87, 10/10/82,6/1/82, 6/7/77, 4/9/77
4.20 A	Determining Pipeline Strain from Soil Displacement	7/30/92	10/12/91
4.20 B	Cast Iron Replacement & Abandonment Program	4/4/94	7/30/92
7.01	Corrosion Control - General	12/12/88	5/9/88, 6/1/82, 3/1/79
7.05	Inspection & Maintenance of Exposed Mains	Deleted	3/29/79
7.1	Corrosion Control	Deleted	Unknown
7.2	Corrosion Test Stations	Deleted	Unknown
7.3	Installation of Magnesium Anodes	Deleted	Unknown
7.4	Handing Coated Pipe	Deleted	Unknown
7.5	Field Coatings	Deleted	Unknown
7.6	Casings	Deleted	Unknown
7.7	Inspection & Maintenance of Exposed Mains	Deleted	Unknown
7.15	Inspection & Maintenance of Exposed Mains	Deleted	8/1/78

Procedure No.	Procedure Title	Effective Date of Most Recent Procedure	Dates of Previous Additions, Deletions & Revisions
7.20	External Pipe Coatings	12/31/02	5/9/88, 6/1/1982
7.30	Electrical Inspection of pipe Coatings	8/1/91	6/1/89, 6/1/82
7.40	Cathodic Test Stations	6/1/82	
7.50	Thermite Brazing of Electrical Connections	6/1/82	
7.60	Atmospheric Corrosion	6/1/89	5/9/88, 7/21/87, 3/1/79
7.70	Casings	5/15/97	12/15/95, 6/1/82, 3/1/79
7.80	Reporting the Condition of Pipe Exposed for Any Reason	12/31/02	10/1/99, 5/15/97, 1/11/95, 4/4/94, 8/1/91, 12/12/88, 6/1/82, 3/1/79
7.85	Cathodic Protection of Underground Propane Storage Tanks.	Deleted	12/12/81
7.90	Corrosion-Control Monitoring and Record Keeping	5/15/97	12/20/89, 12/12/88, 5/9/88, 6/1/82, 12/1/79, 3/1/79, 12/1/78
14.15	Repair of Gas Leak on Distribution Line	12/31/02	7/28/00, 7/15/98, 5/17/97, 3/13/95, 8/1/91, 6/1/82

COMMONWEALTH OF MASSACHUSETTS
DEPARTMENT OF TELECOMMUNICATIONS AND ENERGY

RESPONSE OF BAY STATE GAS COMPANY TO THE
TWENTY-THIRD SET OF INFORMATION REQUESTS FROM ATTORNEY GENERAL
D. T. E. 05-27

Date: June 23, 2005

Responsible: Danny G. Cote, General Manager

AG-23-11 Produce a copy of the Company's Corrosion Monitoring Program manual and any reports related to the monitoring program.

Response: Please see Bay State's Response to AG-23-10.